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10/540,235	06/21/2005	Morten Norgaard	3789-2091	1619
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WILLIAM J. SAPONE	COLEMAN SUDOL SAPONE P.C.		BUTLER, PATRICK NEAL	
714 COLORADO AVENUE	BRIDGE PORT, CT 06605		ART UNIT	PAPER NUMBER
			1791	
		NOTIFICATION DATE	DELIVERY MODE	
		03/08/2010	ELECTRONIC	

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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<b>Office Action Summary</b>	<b>Application No.</b> 10/540,235	<b>Applicant(s)</b> NORGAARD, MORTEN
	<b>Examiner</b> Patrick Butler	<b>Art Unit</b> 1791

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
  - If no period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED. (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) Responsive to communication(s) filed on 07 October 2009.
- 2a) This action is FINAL.      2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) Claim(s) 9-24 is/are pending in the application.
- 4a) Of the above claim(s) 9-15, 19 and 20 is/are withdrawn from consideration.
- 5) Claim(s) \_\_\_\_\_ is/are allowed.
- 6) Claim(s) 16-18 and 21-24 is/are rejected.
- 7) Claim(s) \_\_\_\_\_ is/are objected to.
- 8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) All    b) Some \* c) None of:  
 1. Certified copies of the priority documents have been received.  
 2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- 1) Notice of References Cited (PTO-892)  
 2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  
 3) Information Disclosure Statement(s) (PTO/152/8)  
 Paper No(s)/Mail Date 20091007
- 4) Interview Summary (PTO-413)  
 Paper No(s)/Mail Date \_\_\_\_\_  
 5) Notice of Informal Patent Application  
 6) Other: \_\_\_\_\_

**DETAILED ACTION**

***Information Disclosure Statement***

The information disclosure statement filed 07 October 2009 fails to comply with the provisions of 37 CFR 1.97, 1.98 and MPEP § 609 because the following references fail to provide required identification including a date of publication: Danish Search Report. As required by MPEP § 609.04(a), "Each publication must be identified by publisher, author (if any), title, relevant pages of the publication, and date and place of publication. The date of publication supplied must include at least the month and year of publication, except that the year of publication (without the month) will be accepted if the applicant points out in the information disclosure statement that the year of publication is sufficiently earlier than the effective U.S. filing date and any foreign priority date so that the particular month of publication is not in issue. The place of publication refers to the name of the journal, magazine, or other publication in which the information being submitted was published." It has been placed in the application file, but the information referred to therein has not been considered as to the merits. Applicant is advised that the date of any re-submission of any item of information contained in this information disclosure statement or the submission of any missing element(s) will be the date of submission for purposes of determining compliance with the requirements based on the time of filing the statement, including all certification requirements for statements under 37 CFR 1.97(e). See MPEP § 609.05(a).

***Election/Restrictions***

Applicant's election of Species B in the reply filed on 11 February 2009 is acknowledged. Because applicant did not distinctly and specifically point out the supposed errors in the restriction requirement, the election has been treated as an election without traverse (MPEP § 818.03(a)).

In Applicant's Amendments filed 07 October 2009, Claims 18 and 20 are presented by Applicant with the status identifier of "(Withdrawn-New)." In Applicant's Arguments filed 07 October 2009, Claims 18 and 20 are indicated by Applicant to correspond to withdrawn Claims 2 and 4. However, New Claim 18 appears to be generic.

Claims 19 and 20 are withdrawn from further consideration pursuant to 37 CFR 1.142(b) as being drawn to nonelected species restricted as Species A and C, respectively, there being no allowable generic or linking claim. Election was made **without** traverse in the reply filed on 11 February 2009.

#### ***Claim Objections***

Claims 21-23 are objected to under 37 CFR 1.75(c) as being in improper form because a multiple dependent claim should refer to other claims in the alternative only. See MPEP § 608.01(n). Accordingly, the claims have not been further treated on the merits.

#### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 16- 18, and 24 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kern (US Patent No. 5,051,223) and in view of in view of Steiro (US Patent No. 4,039,642).

With respect to Claim 16, Kern teaches a concrete pipe with an impregnated inner wall (a method for manufacturing a lined concrete pipe comprised of an outer concrete layer and an inner layer having a greater density surface structure) (see abstract and col. 1, lines 30-58). The pipe is formed between vertical pipe form 1 and roll head of the pipe press (providing outer mould parts and a inner mould part forming a core, a space formed between the inner mould parts and outer parts having a shape of the lined concrete pipe) (see fig. and col. 1, lines 62-68). Concrete is introduced into the pipe form to produce a cylindrical mass (filling the space with concrete) (see col. 1, lines 30-43). Prestressing nozzles 13 of smoothing cylinder 5 supply a liquid impregnation material on the inner wall of the cylindrical mass (providing an applicator in association with the inner mould part, the applicator having one or more supply openings; supplying a further material with a greater density for delivery through the supply openings of the applicator) (see col. 1, lines 62 through col. 2, line 34 and figure). Pressing rolls 6 would provide periodic compression of the cylindrical concrete mass before the prestressing nozzles 13 of smoothing cylinder 5 supply a liquid impregnation material (said applicator supplying the inner layer during simultaneous or during immediately following) (see col. 1, lines 62 through col. 2, line 34) would necessarily constitute vibration (vibration of the concrete). Kern's rollerhead is rotated

during introduction, compaction, and smoothing of the materials introduced into the mold, which causes the inner wall to include the impregnation material that the outer wall does not (at least partially rotating the inner mould part during delivery of the further material for merging the further material with the concrete for forming the inner layer having the greater density surface structure on at least a portion of an inner surface of the concrete) (see col. 1, lines 30-58 and col. 2, lines 17-67), which makes the surface more dense (inner layer of greater density in surface structure).

Applicant refers to density in terms of density of surface structure and as being a degree of being impervious to entry at its surface (see Applicant's PCT Specification, page 4, lines 4-21). Thus, Kern meets the limitation of the "greater density" of the "further material" by being a protective layer material that is fine enough to permeate into the concrete (see col. 1, lines 14-16 and 30-43).

However, Kern does not appear to expressly teach that the supply opening extend in the longitudinal direction of the core.

Steiro teaches making concrete pipe by using an opening that is longitudinal (essentially extend in the longitudinal direction of the core) (see abstract).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Steiro's longitudinal opening in Kern's core in order to facilitate expedited processing (see col. 1, lines 23-44) and because longitudinal openings fulfill the same purpose of providing molding material.

With respect to Claim 17, Kern teaches smoothing cylinder 5 contains prestressing nozzles 13 (an applicator unit in direct connection with the inner mould part or core) (see col. 1, lines 62 through col. 2, line 34 and figure).

With respect to Claim 18, Kern's pipe press contacts and compacts the concrete with pressing rollers 6 then smoothes the concrete with cylinder 5 while intruding the impregnation material (see col. 1, lines 30-43 and col. 2, lines 16-67). Thus, the rollerhead and pipe are necessarily moved longitudinally with respect to each other to allow the sequence.

With respect to Claim 24, the impregnating resin is in the form of a liquid (see col. 2, line 57).

Claims 16-18, and 24 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kern (US Patent No. 5,051,223) and in view of in view of Steiro (US Patent No. 4,039,642) and Hutchinson (US Patent No. 2,356,852).

With respect to Claims 16-18 and 24, Kern in view of Steiro teaches making a concrete pipe as described above.

However, if Kern's periodic compression by pressing rolls 6 before interaction with prestressing nozzles 13 of smoothing cylinder 5 (see col. 1, lines 62 through col. 2, line 34) is held to not necessarily constitute vibration, Hutchinson teaches vibration of the core in producing concrete pipe (see page 2 of text, lines 3-22).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Hutchinson's use of vibrations in Kern's core in order to

make a pipe with better wear resistance (see Hutchinson, page 2 of text, right column, lines 36-39).

***Response to Arguments***

Applicant's arguments filed 07 October 2009 have been fully considered, but they are not persuasive.

Applicant argues with respect to the claim objections rejections. Applicant's arguments appear to be on the grounds that:

- 1) The new claims, Claims 21-23, are in proper multiple dependent claim form.

Applicant argues with respect to the 35 U.S.C. § 102(b) rejections. Applicant's arguments appear to be on the grounds that:

- 2) The 35 U.S.C. § 102(b) rejections are overcome via incorporation of the subject matter of Claims 1 and 3, which were rejected under 35 U.S.C. § 103(a).

Applicant argues with respect to the 35 U.S.C. § 103(a) rejections. Applicant's arguments appear to be on the grounds that:

- 3) Kern describes the application of an impregnating layer. However, it is not a material that can provide an inner layer having a greater density structural surface since it diffuses by pressure into the concrete.

4) Hutchinson's use of vibration is not associated with promoting an inner layer having a greater density structural surface.

- 5) Steiro is cited for teaching using a longitudinal opening. However, the opening is not on a mold core.

6) Given a lack of motivation to combine the references, hindsight reconstruction is relied upon.

The Applicant's arguments are addressed as follows:

1) Claims 21-23 each depend from all of claims 16-20 rather than in the alternative only. Thus, as recited above:

Claims 21-23 are objected to under 37 CFR 1.75(c) as being in improper form because a multiple dependent claim should refer to other claims in the alternative only. See MPEP § 608.01(n). Accordingly, the claims have not been further treated on the merits.

2) Applicant's arguments with respect to the new claims have been considered but are moot in view of the new ground(s) of rejection.

3) Kern's prestressing nozzles 13 of smoothing cylinder 5 supply a liquid impregnation material on the inner wall of the cylindrical mass (see col. 1, lines 62 through col. 2, line 34 and figure). The impregnation material meets the claimed limitation of "supplying a further material with a greater density" as recited above:

Applicant refers to density in terms of density of surface structure and as being a degree of being impervious to entry at its surface (see Applicant's PCT Specification, page 4, lines 4-21). Thus, Kern meets the limitation of the "greater density" of the "further material" by being a protective layer material that is fine enough to permeate into the concrete (see col. 1, lines 14-16 and 30-43).

3) Moreover, Applicant's argument describing Kern's material diffusing by pressure into the concrete indicates how Kern meets Claim 16's requirement of

"merging the further material with the concrete for forming the inner layer." Thus, Kern's liquid impregnation material is not contrary to the claim's requirement.

4 and 5) In response to applicant's arguments against the references individually, one cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986).

4) Hutchinson is not expressly relied upon promoting an inner layer having a greater density structural surface; Hutchinson is relied on for teaching vibration of the core in producing concrete pipe (see page 2 of text, lines 3-22), and Kern is relied upon for teaching that the rollerhead is rotated during introduction, compaction, and smoothing of the materials introduced into the mold, which causes the inner wall to include the impregnation material that the outer wall does not (see col. 1, lines 30-58 and col. 2, lines 17-67), which makes the surface more dense (inner layer of greater density in surface structure).

5) In response to applicant's argument that Steiro's opening is not in a mold core, the test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981).

5) Steiro is not relied upon for teaching an opening in a mold core; Steiro is relied upon to teach making concrete pipe by using an opening that is longitudinal (see abstract). Kern is relied upon to teach an opening in a mold core by teaching that prestressing nozzles 13 of smoothing cylinder 5 supply a liquid impregnation material on the inner wall of the cylindrical mass (see col. 1, lines 62 through col. 2, line 34 and figure).

6) Applicant's argument that motivation to combine has not been established does not address the motivation as cited on pages 5 and 6 of the Office Action mailed 8 July 2009:

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Steiro's longitudinal opening in Kern's core in order to facilitate expedited processing (see col. 1, lines 23-44) and because longitudinal openings fulfill the same purpose of providing molding material.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use Hutchinson's use of vibrations in Kern's core in order to make a pipe with better wear resistance (see Hutchinson, page 2 of text, right column, lines 36-39).

6) In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does

not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

**Conclusion**

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Patrick Butler whose telephone number is (571) 272-8517. The examiner can normally be reached on Mon.-Thu. 7:30 a.m.-5 p.m. and alternating Fridays.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Christina Johnson can be reached on (571) 272-1176. The fax phone

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number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/P. B./  
Examiner, Art Unit 1791

/Christina Johnson/  
Supervisory Patent Examiner, Art Unit 1791